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IN THE CLAIMS

Please cancel claims 36 and 43-47 without prejudice or disclaimer as to the subject matter thereof.

1.-34. (canceled)

35. (currently amended) An implantable multi-chamber pacing system including coronary sinus blood flow sensing capability for detecting an episode of myocardial ischemia, comprising:

atrial sense means for sensing atrial signals from an atrium of a patient's heart;

ventricular sense means for sensing ventricular signals from a patient's right ventricle;

coronary vein sense means disposed within a portion of a coronary sinus or great cardiac vein of the patient for sensing electrical ventricular signals from the patient's left ventricle and for providing an myocardial ischemia signal representing a reduced blood flow rate through the patient's coronary sinus over a period of time, wherein the sense means comprises at least one electrode and a flow meter, respectively; and

signal processing means for analyzing the ventricular signals, the atrial signals and the myocardial ischemia signal representing the reduced blood flow rate to detect a myocardial ischemia cardiac condition based at least in part upon the myocardial ischemia signal.

36. (canceled)

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37. (currently amended) The pacing system of claim 35 and further including dispensing means for dispensing a non-genetically active therapeutic drug when the myocardial ischemia cardiac condition is detected.

38. (currently amended) The pacing system as described in claim ~~35~~ 37, comprising programmer means for remotely programming ~~controlling~~ the signal processing means via a wireless telemetry link.

39. (currently amended) The pacing system as described in claim ~~35~~ 37, further comprising defibrillation means for generating and providing a defibrillation pulse to the patient's heart.

40.-47. (canceled)

48. (new) A computer readable medium for storing software encoded instructions for performing a method of cardiac pacing, including a coronary sinus blood flow sensing capability for detecting an episode of myocardial ischemia and optionally responding to a detected episode with a fluid therapeutic agent, said medium comprising:

instructions for sensing atrial signals from an atrium of a patient's heart;
instructions for sensing ventricular signals from a patient's right ventricle;
instructions for sensing electrical ventricular signals from a location within a portion of a coronary sinus or great cardiac vein of the patient relating to the patient's left ventricle and for providing a myocardial ischemia signal representing a reduced blood flow rate through the patient's coronary sinus over a period of time, wherein the instructions couple to control at least one electrode and at least one a flow meter, respectively; and

instructions for analyzing the ventricular signals, the atrial signals and the myocardial ischemia signal representing the reduced blood flow

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rate to detect a myocardial ischemia cardiac condition based at least in part upon the myocardial ischemia signal.

49. (new) A computer readable medium according to claim 48, further including instructions for dispensing a non-genetically active therapeutic drug when the myocardial ischemia cardiac condition is detected.

50. (new) A computer readable medium according to claim 49, further comprising instructions for remotely programming the signal processing means via a wireless telemetry link.

51. (new) A computer readable medium according to claim 49, further comprising instructions for generating and providing a defibrillation pulse to the patient's heart.